

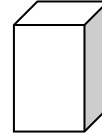
Unit 1 - Lesson 9

Volume Word Problems

Examples :

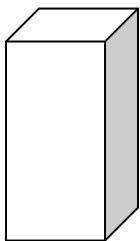
1. Math-O's cereal is sold in a single-serving size box in the shape of a rectangular prism of dimensions 5 cm by 4 cm by 10cm.

a) Calculate how much cereal this box can hold.

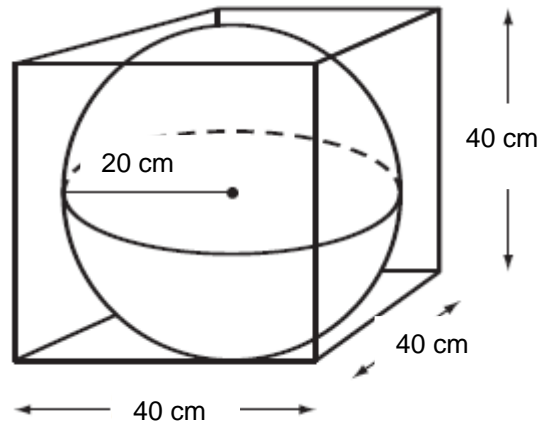


b) If the dimensions of the box are doubled, what do you think will happen to the volume?

c) Test your hypothesis by calculating the volume of the box with the new dimensions.



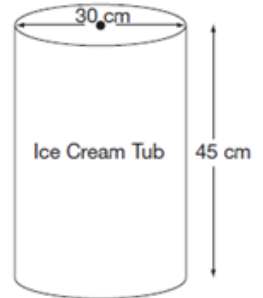
2. Determine the volume of space not occupied by the ball inside the box



Worksheet

Answer each of the following on a separate sheet of paper.

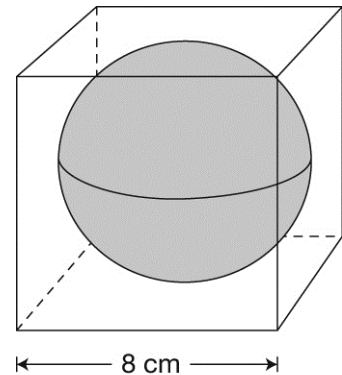
1. An ice cream shop sells ice cream cones that each contain an average of 525 cm^3 of ice cream. The ice cream is served from the following cylindrical tub.



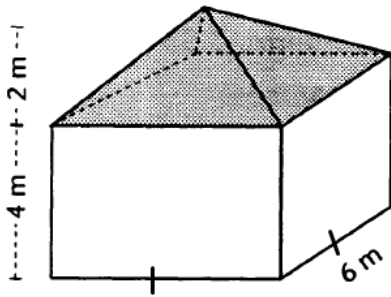
About how many cones can be made from a full tub of ice cream?

2. The diagram shows a spherical globe in a cube-shaped box. The globe fits tightly in the box.

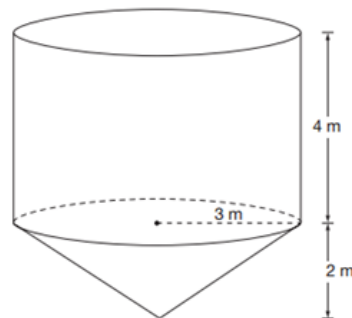
Determine the volume of empty space in the box.



3. Determine the volume of the figure below.



4. A container that stores grain is in the shape of a cylinder and cone as shown below.



What is the volume of the container?